

KARL LEWIS

karllewisdesign.com

EXPERIENCE

Auria LLC

Software Engineer III - Lead Game Developer

Software Engineer II - Game Developer

Software Engineer I - Game Developer

Colorado Springs, CO

January 2025 - Present

May 2023 - January 2025

June 2020 - May 2023

- Develops **BORG**, an award-winning gamified training app used to enhance combat readiness of 400+ USSF/USAF personnel.
- Architects scalable software solutions using Unity and C#, ensuring a maintainable and efficient codebase.
- Leads an agile development team as Scrum Master, removing development blockers to increase sprint velocity by 15%.
- Manages stakeholder requirements as Product Owner by refining the product backlog and defining acceptance criteria.
- Spearheaded the development of **Keplera**, extending **BORG** capabilities to civilian academia and commercial space operations.
- Created a mixed-reality prototype for **BORG**, expanding use cases to VR/AR environments.
- Delivers high-profile software demonstrations to generals, executives, and trade show audiences, driving adoption and sales.
- Mentors junior developers as a lead developer, fostering a collaborative team culture and reducing onboarding time by 30%.
- Assists with development of the BORG Web user dashboard and interface using MongoDB, React, and TypeScript.

Icebreaker Industries

Animation Programmer (Volunteer Side Project)

Remote

November 2020 - June 2021

- Collaborated with a global team on **Project Borealis**, a fan-driven project inspired by the *Half-Life* video game series.
- Programmed advanced animation logic and inverse kinematics for characters and weapons using Unreal Engine 5 and C++.

Emergent Media Center

Interactive UI/UX Designer

Burlington, VT

August 2019 - May 2020

- Designed and implemented UI/UX for an experimental augmented reality mobile game using Unity and C#.
- Led a multidisciplinary team to ensure project milestones were met, delivering a polished and engaging user experience.

PROJECTS

BORG: Award-winning gamified simulation platform that trains USSF/USAF users on orbital warfare and space domain awareness fundamentals.

Keplera: Civilian version of **BORG** used by commercial space groups (JCO) and academia to intuitively teach space concepts and scenarios.

Blue Force Defender: Gamified training tool for Integrated Air and Missile Defense training and tactics with fully featured scenario authoring.

Project Borealis: Prologue: Fan-made tech demo of *Half-Life 2* gameplay and story continuation recreated faithfully in Unreal Engine 5.

Cash Force: Virtual reality arcade-style first person shooter that bridges the gap between realistic simulation and arcade-y fun.

Shotgun Shootout: Experimental procedurally animated FPS where users manually cycle a pump action shotgun using mouse movements.

Bolter, Bolter, Bolter!: Simplified simulation of a carrier landing scenario in an F/A-18 Hornet with detailed HUD and aircraft simulation.

Simple Sandwich: Four-player "couch-competitive" party game where players compete to craft the most delicious sandwiches.

Snowball Showdown: 1v1 competitive multiplayer virtual reality game that simulates a snowball fight with dynamic fort-crafting gameplay.

SKILLS

C#, C++, Unity, Unreal Engine 5, GitLab, Jira, Confluence, Adobe CC, Docker, SonarQube, Python, WebGL, MongoDB
Servant Leadership, Problem Solving, Stakeholder Relations, Technical Writing, Public Speaking, Attention to Detail, Organization

CERTIFICATIONS

TS//SCI Clearance (Active)

Certified Scrum Product Owner (2023), Certified Scrum Master (2021), Private Pilot Certificate (2022), Eagle Scout (2015)

EDUCATION

Champlain College | Burlington, VT

Graduated May 2020

Bachelor of Science in Game Design | Minor in Game Programming